ABSTRACT OF THE DISCLOSURE

An optical fiber includes center and first side cores. An apparent refractive index differences of the center and first side cores are 1.15 to 1.40% and -0.60 to -0.35, respectively. A constant expressing a profile of a distribution of refractive index of the center core is 1.0 to 5.0. A ratio of diameters of the first side and center cores is 1.6 to 2.4. A dispersion value is -60 to -35 ps/nm/km, a dispersion slope is -0.40 to -0.10 ps/nm^2/km, a transmission loss is 0 to 0.35 dB/km, a ratio of loss to dispersion is 120 to 500 (ps/nm)/dB, a polarization mode dispersion is 0 to $0.15\mathrm{ps}/\sqrt{\mathrm{km}}$, and an effective core area is 19 to 50 μm^2 when the wavelength is 1.55 μm band. A bending loss at a diameter of 20 mm is 0 to 5 dB/m.